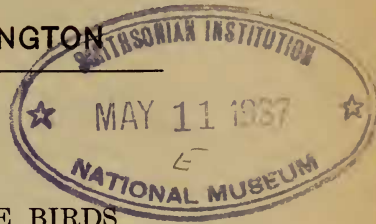


PROCEEDINGS  
OF THE  
BIOLOGICAL SOCIETY OF WASHINGTON



REVISIONAL NOTE ON THE DIDINE BIRDS  
OF RÉUNION.

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The existence of two types of Didine birds on Réunion, one of the Mascarene Islands, has long been suspected. Strickland, in his monumental book on "The Dodo and its Kindred" (1848), conscious of his inability to harmonize the contradictory elements in the four accounts of the Réunion Dodo which constitute our sole historical evidences of this bird, says that they give "us a clear proof that a second species of the same group of birds inhabited that island." Rothschild, in his "Extinct Birds" (1907), gives us two drawings of the Réunion Dodo, one in Didine form, another in Solitaire form, but he makes little or no comment on his conjectural figures. Oudemans, as recently as 1917, in his *Dodo-Studien*, dismisses the problem by assuming that all four accounts describe the same bird, namely, the White Dodo, any discrepancies in the four records being accounted for either by assumed inaccuracy on the part of the observer or by Oudemans' favorite theory of seasonal changes in the bird's stature.

After careful study of a feather-picture of a Didine bird dating from 1618, published by Dr. Casey Wood in the *Ibis*, pl. xix, 1927, I believe that I have found a satisfactory solution of this problem. Details of the picture indicate that it was carefully done, with the exception of the lower left corner, which is unfinished, thus giving the impression that the leg is poorly executed. Careful comparison of this picture with other pictorial evidences of the Dodo and the Solitaire has convinced me that we have here the picture of a bird very much like the male Solitaire of Rodriguez.

The Réunion Solitaire differs from that of Rodriguez in that it has a much larger head and a very high mandible which does not have a pronounced hook at the tip. The nostril opening is placed at the anterior

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edge of the mandible. The eye is surrounded by naked skin, the tarsus is long and heavy, the thighs muscular. The tail unlike that of the Rodriguez Solitaire, presents a tuft-like appearance which suggests that of an ostrich.

On the basis of comparison with the male of the Rodriguez Solitaire, I conclude that the two specimens known to us must be, because of their brown color, males, the female of this species being still unknown to us.

That it can not be identified, however, as *Pezophaps solitaria*, is clear from the circumstance that the latter is known as having inhabited only Rodriguez, an island which remained in a deserted and uninhabited state long after the other islands of the group had begun to be colonized. It was not visited, as far as we know, until in 1791, Leguat and his Huguenot companions established themselves there for two years. This was almost 200 years after the above-mentioned feather-picture was made in Italy. Even allowing for some previous knowledge of the island, without which such an adventurous colonization as that of Leguat could not have taken place, it is quite inconceivable that any products of Rodriguez had been brought to Europe as early as 1618. This same circumstance applies to the account of Lestrange, who speaks of having seen in 1638 "a strange fowl" which the keeper in London called a Dodo. Strickland and all later students of the Dodo have misidentified this bird as a Common or Grey Dodo of Mauritius, whereas it is clearly of the Solitaire type, being, as Lestrange himself says, "a great fowl somewhat bigger than the largest turkey-cock, and so legged and footed, but stouter and thicker and of a more erect shape, coloured before like the breast of a young phesan and on the back of dunn or deare colour." But since Rodriguez was unknown at this time as well, this bird, while not to be identified as *Raphus cucullatus* (-*Didus ineptus*) can not be considered an example of *Pezophaps solitaria* if we wish to avoid anachronism. It will be seen that the feather-picture satisfies the description in every respect.

In addition to this, the accounts of Carré and DuBois, which have hitherto been recognized as constituting the chief discordant notes in the description of the White Dodo, not only specifically speak of them as Solitaires but also find their counterpart admirably in the Milan picture. Critics may be assumed to be correct in judging DuBois' account either as inaccurate or as confusing the appearance of two different birds, especially as pertains to colour, but his insistence upon an ostrich-like tail is extremely well substantiated by the bird figured by the Italian artist of 1618. This is a feature which distinguishes it from the Solitaire of Rodriguez.

I am convinced, therefore, that Reunion had two Didine birds, the one the well-known so-called White Dodo, clearly indicated in the accounts of Tatton and Bontekoe, and in the famous paintings of Holsteyn and Withoos, and closely related to the Common Dodo of Mauritius, the other this new type of Didine bird, hitherto overlooked, and closely related to *Pezophaps*.

Since all the nomenclature hitherto applied to the White Dodo, including *Ornithoptera solitaria* (de Sélys-Longchamps) (which must now be applied to the new type) was based upon the testimony of Carré's account of the Solitaire and DuBois' account of the *Oiseau Solitaire*, and since these must

now be thought of as descriptive of this new Didine bird, the true White Dodo becomes nameless. I therefore name it

**Victoriornis imperialis**, gen. et sp. nom. nov.

I have dedicated the naming of this bird to His Majesty King Vittorio Emmanuel of Italy, by His gracious permission, since an Italian picture furnished the clue toward the solution of this problem.

The White Dodo is generically distinct from the Common Dodo of Mauritius. The bill is much broader, has a rounded tip instead of a pronounced hook, and shows no signs of a moulting horny sheath, as does the Common Dodo. The shape, position and structure of the tail are also different.

These two Dodos, *Raphus* and *Victoriornis*, together constitute a family *Raphidæ*, distinct from that of the two Solitaires, *Pezophaps* and *Ornithaptera*. Both *Pezophapidæ* show the following characteristics in contrast to the two *Raphidæ*: tall stature, a small bill without transverse rugosities, strong sexual dimorphism, small head, relatively very little cancellous tissue in the cranium, four sternal ribs instead of five, and the wing tip equipped with strong horny growth. In addition to these marks, they are distinguished by more than 20 other osteological differences. The edibility of the Solitaire was superior to that of the Dodos.

DESCRIPTION OF *Ornithaptera solitaria* (DE SÉLYS-LONGCHAMPS).

Caput cinerium; collum et corpus paululum obscuriora quam caput; alae, caudem et femora brunnea, inter colores brunneibenzoini et brunneicapilli; iris negra; irid caeruleum; rostrum superius colore dorsi; lingua rosacea; naris magna, posita ad anteriorem partem rostri et circumdata linea caerulea; tibiae et pedes tam obscura quam femue et maiores quam illi Meleagris gallopabonis.

The study of the Dodo has been much neglected, and I hope shortly to bring out a complete revisional analysis.